

## REHABILITATION AT ILUKA MURRAY BASIN

Iluka recognises the importance of responsible stewardship of the natural and agricultural environments in which we operate. We are committed to rehabilitating all of our mines to a sustainable post-mining land use. In most cases, this means restoring the land use that existed prior to mining.

Iluka is proud of its strong track record in mine rehabilitation and closure, spanning more than 50 years across Australia including 17 years in the Murray Basin. This allows us to learn from our previous experience to continually improve and refine our rehabilitation techniques. We collaborate with relevant regulatory authorities and landowners to prepare comprehensive rehabilitation plans for our mines, which establish our legal obligations and completion criteria for rehabilitation.

### HOW DO WE REHABILITATE LAND?

Iluka's rehabilitation planning starts before mine construction. We conduct studies on the proposed mine site and surrounding region to understand the soil types and profile, agricultural productivity, native flora and fauna, and water characteristics. The information gathered in these studies is used to develop designs and schedules for rehabilitation.

Rehabilitation planning also includes confirming the post-mining land use, identifying and managing rehabilitation risks, determining relevant closure objectives and completion criteria, undertaking research to address knowledge gaps, and developing rehabilitation management and engineering prescriptions.

A key aspect of our rehabilitation is the management of soil resources. When earthworks commence, we remove topsoil, subsoil and overburden (the deeper soils above the ore) in layers.

These layers are stockpiled separately so that they can be replaced appropriately during rehabilitation.

Once the topsoil is replaced, the land is revegetated to establish pasture, crops or native vegetation. Mine infrastructure which provides value to the post-mining land use may be kept, if it is acceptable to Iluka and the landowner. Examples include bores, roads, and sheds or workshops.

Iluka typically adopts a progressive rehabilitation approach, which means that rehabilitation starts as soon as possible after ore has been mined in a pit. This means that some parts of a mine pit may be backfilled and rehabilitated while other parts of the pit are still being excavated and mined. This reduces the need to double-handle overburden and soils, and the amount of rehabilitation required when mining is finished. Progressive rehabilitation also reduces the total disturbed area and impacts such as surface water runoff and dust.

Iluka manages and monitors rehabilitated land for several years to ensure that the agreed mine closure objectives and completion criteria have been met. If monitoring shows that the rehabilitated land does not meet the agreed objectives, we work with landowners and regulatory authorities to plan and carry out further work to improve the affected land.



RESEARCH



COLLABORATION



MONITORING



SUSTAINABILITY

## COMPLETION OF REHABILITATION

Upon completion of rehabilitation activities on a mine site, Iluka prepares a completion report with data to show that agreed rehabilitation objectives have been met. This is supported by investigation reports from experts such as agronomists and engineers. Regulatory authorities then assess the rehabilitation at the site to confirm that it is complete and that relevant legal obligations have been met. In Victoria and NSW, once the regulatory authority is satisfied with the rehabilitation, the return of a monetary bond can be facilitated.

It is very common for rehabilitation plans to set targets for landform, groundwater, surface water, native vegetation and agricultural productivity that have to be shown to be met for regulatory sign-off to occur. If objectives are not met within the assessment period, remedial work or further monitoring is required until these targets have been achieved.

Rehabilitated agricultural land on Iluka's former Kulwin mine in western Victoria



### DID YOU KNOW?

Iluka has completed over 18,000 hectares of rehabilitation on our former mine sites, comprising 14,000 hectares of agricultural land and 3,000 hectares of native vegetation.

## ILUKA IN THE MURRAY BASIN

Iluka has been mining in western Victoria since 2005 and has a dedicated rehabilitation team. Many years of experience and the ability to draw on learnings from the rehabilitation of our Kulwin, Echo, WRP and Douglas mine sites in the region means we are always improving our rehabilitation processes and employing new technologies to achieve full and sustainable rehabilitation of land in collaboration with regulators, farmers and other stakeholders. Our mission as a company to deliver sustainable value applies to our rehabilitation as much as it does to our operations.



### AGRICULTURE

In cases where a mine is developed on agricultural land, extensive rehabilitation processes take place to ensure that land can be returned to productive agricultural use for cropping or grazing. Iluka has a strong history of returning land to productive agricultural use throughout Australia, including in western Victoria. Where appropriate, plans are made with landowners in addition to regulatory authorities to determine requirements.

Prior to mining, an agricultural assessment is undertaken to understand the characteristics of the soils and the agricultural productivity of the land. Rehabilitation completion criteria are established that typically require the rehabilitated land to support agricultural productivity comparable to district averages. Upon completion of rehabilitation, a post-mining agricultural assessment is undertaken to demonstrate that the agricultural production has been re-established and can be maintained.

During the monitoring phase, the land may be utilised by farmers to conduct agricultural activities in line with the approved post-mining land use prior to full completion and handover.

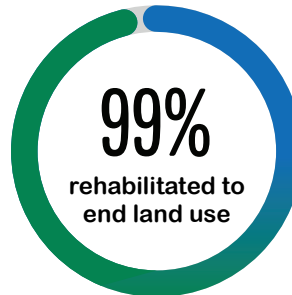
### ILUKA'S FORMER MURRAY BASIN MINE SITES

Rehabilitation status at end-2023

#### Kulwin mine

Mined 2009-2012

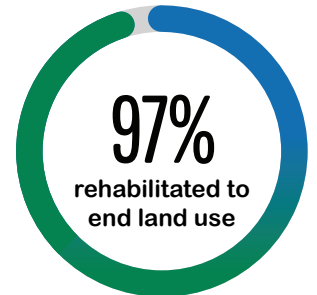
778 ha disturbance footprint



#### Echo mine

Mined 2009-2012

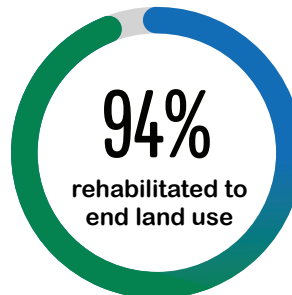
169 ha disturbance footprint



#### WRP mine

Mined 2012-2015

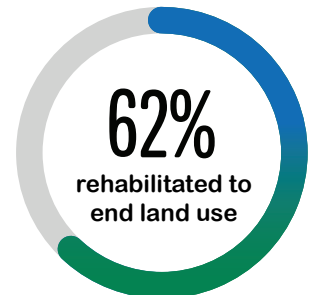
1,118 ha disturbance footprint



#### Douglas mine

Mined 2005-2012

905 ha disturbance footprint



 1800 305 993 (24/7 Iluka Community hotline)

 [communities.support@iluka.com](mailto:communities.support@iluka.com)

 <https://www.iluka.com/sustainability>

**ILUKA**

